

Final Report

Strategic Regional Arterial

IL ROUTE 47/IL ROUTE 71/U.S. ROUTE 34
IL ROUTE 47: U.S. ROUTE 30 (BASE LINE ROAD)
TO IL ROUTE 71
IL ROUTE 71/U.S. ROUTE 34: IL ROUTE 47
TO U.S. ROUTE 30

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Executive Summary

Since the early 1970s, development patterns have reflected a significant migration of people and employment from the City of Chicago to the surrounding suburbs. Though the region's population grew by only 4% during the 20-year period from 1970 to 1990, the region's urbanized area increased by approximately 70%. This new development created dramatically different travel patterns. While the principal transportation systems were designed to efficiently handle traditional suburb-to-city commuting patterns, significant growth occurred in suburb-to-suburb travel. These new travel demands overwhelmed the capacity of many of the region's expressways and arterial streets, causing traffic to spill over into adjacent neighborhoods as drivers have attempted to avoid congestion. Despite significant investments in transportation system improvements over the last two decades, traffic congestion in the Chicago region has increased steadily.

Regional population and employment forecasts suggest that even more difficult challenges lie ahead. The Northeastern Illinois Planning Commission (NIPC) has estimated that the region's population will increase by as much as 24% between 1990 and 2020; this is four times the growth rate experienced between 1970 and 1990. Employment in the region is expected to increase by as much as 37% over the same period. Though growth will continue in outlying suburban areas, significant infill growth is expected to occur in the City of Chicago and inner-ring suburbs as well. If the region's economic vitality and quality of life are to be preserved in the face of this expansion, significant improvements to transportation mobility must be achieved.

Transportation planning agencies have recognized that needed mobility improvements cannot be achieved solely through expansion of the region's expressway system. Thus, they are planning the creation of the Strategic Regional Arterial (SRA) system which is a comprehensive network of 1,340 miles of existing arterial highways in Northeastern Illinois. The SRA system is intended to supplement existing and proposed expressway facilities in accommodating long-distance, high volume automobile and commercial vehicle traffic. In order to meet the objectives of the SRA system, it will be necessary to transform the historic context of these arterial highways to one which emphasizes traffic mobility while still accommodating land access needs.

This report summarizes a planning study conducted for one of the routes on the SRA system: IL Route 47/IL Route 71/U.S. Route 34. This corridor follows IL Route 47 from the Kane/Kendall county line at U.S. Route 30 (Base Line Road) south to the intersection with IL Route 71; it then follows IL Route 71/U.S. Route 34 northeast to U.S. Route 30. The study developed a conceptual improvement plan which, when implemented, will significantly improve transportation mobility along the corridor. The study is considered a "pre-Phase I" study, since it may be a number of years before the SRA improvements can be realized. Before constructing these improvements, detailed Phase I engineering and environmental studies as well as Phase II design activities must still be completed. The concept plan is primarily intended to serve as a guide for land use and access decisions that will be made along the route between now and when an SRA improvement could actually be constructed. It is hoped that the long-range SRA plan for this route will be used by local agencies in their land use planning activities. Only with the support of the communities through which IL Route 47/IL Route 71/U.S. Route 34 passes, can the ultimate improvement plan be realized.

The IL Route 47/IL Route 71/U.S. Route 34 SRA corridor has been divided into five segments for the purposes of this study. Following is a summary of the major improvement recommendations within each segment.

Segment 1: IL Route 47 - Base Line Road to Corneils Road, north of Yorkville

- Widen IL Route 47 to provide two 12-foot travel lanes in each direction separated by a 42-foot grass median. This will require from 50 to 65 feet of additional right-of-way acquisition.
- Realign IL Route 47 to the east in the vicinity of the Galena Road intersection to improve safety conditions. The IL Route 47/Galena Road intersection is currently a high accident location. This will require 60 - 160 feet of additional right-of-way acquisition.
- Open drainage.
- Signalize the intersection of IL Route 47 with Corneils Road

Segment 2: IL Route 47 - Corneils Road to Walnut Street, Yorkville

- Widen IL Route 47 to provide two 12-foot travel lanes in each direction separated by an 18-foot barrier median. This cross section requires 100 feet of right-of-way, and will require up to 20 feet of right-of-way acquisition in parts of segment 2.
- Provide curb & gutter with an enclosed drainage system.
- Consolidate access to designated channelized intersections and restrict driveways to right-in/right-out.
- Signalize the intersections of IL Route 47 with Wheaton Avenue (Proposed Metra station), Amuro/Remline Factory access, Cannonball Trail, and Kennedy Road.

Segment 3: IL Route 47 - Walnut Street to IL Route 126, Yorkville

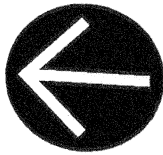
- Widen IL Route 47 to provide two 12-foot travel lanes in each direction with a flush median and center left-turn lane. Provide two 12-foot travel lanes in each direction with a 4 foot barrier median on the existing bridge crossing the Fox River in downtown Yorkville. The recommended cross sections in this segment require 80 to 90 feet of right-of-way. In certain locations this can be accommodated in the existing right-of-way; in other locations up to 15 feet of right-of-way acquisition will be required.
- Provide curb & gutter with an enclosed drainage system.
- Implement access management in strategic locations with the use of cul-de-sacs and right in/right out restrictions on cross streets.
- Relocate existing on-street parking on IL Route 47 in downtown Yorkville.
- Signalize the intersection of IL Route 47 with Walnut Street, Spring Street, and Main Street, Yorkville. Remove the existing signal on IL Route 47 at Somonauk Street.

Segment 4: IL Route 47 - IL Route 126 to IL Route 71

- Widen IL Route 47 to provide two 12-foot travel lanes in each direction separated by an 18-foot barrier median. This cross section requires 100 feet of right-of-way, and will require 20 feet of right-of-way acquisition.
- Provide curb & gutter with an enclosed drainage system.
- Consolidate access to designated channelized intersections and restrict driveways to right-in/right-out.
- Signalize the intersection of IL Route 47 with Greenbriar Road.

Segment 5: IL Route 71/ U.S. Route 34 - IL Route 47 to U.S. Route 30

- Widen IL Route 71 to provide two 12-foot travel lanes in each direction separated by an 18-foot barrier median from IL Route 47 to Washington Street/Plainfield Road in the Village of Oswego. East of Washington Street/Plainfield Road, the median will transition to a 14 foot painted median in order to maintain existing access. This cross section requires 100 feet of right-of-way. Along IL Route 71, from IL Route 47 to U.S. Route 34, this cross section can be accommodated in the existing right-of-way. From the IL Route 71 to U.S. Route 30 this cross section will require acquisition of 20 feet of right-of-way.
- Provide curb & gutter with an enclosed drainage system.
- Consolidate access to designated channelized intersections and restrict driveways to right-in/right-out west of Washington Street/Plainfield Road, Oswego.
- Signalize the intersections of IL Route 47 with Country Hills Drive, IL Route 126, Hilltop Drive, Van Emmon Road/Country Lane, Winding Creek Road, Minkler Road, Main Street/Paradise Parkway, Forest Avenue, Pearces Ford Road, Heritage Drive and Kendall Point Drive.
- Realign the following intersections to eliminate unsafe conditions or offsets: IL Route 71/IL Route 126, IL Route 71/Wing Drive, IL Route 71/Paradise Parkway, U.S. Route 34/Pfund Street, and U.S. Route 34/Douglas Road.
- Install a frontage road on the north side of IL Route 71, just west of Main Street, Oswego to serve the five single-family residences located there. Full access will be provided via the IL Route 71/Main Street signalized intersection.
- Cul-de-sac the south leg of existing Douglas Road and the north leg of Old Douglas Road.
- Modify three structures carrying IL Route 71/U.S. Route 34 over Morgan and Waubensee Creeks. These structures will need to be widened to accommodate a five-lane cross section.



Illinois Department of Transportation

SRA
Strategic
Regional
Arterial
Planning Study

IL ROUTE 47/IL ROUTE 71/ US ROUTE 34
CORRIDOR SUMMARY (IL ROUTE 47)
EXHIBIT 2.2

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